

# Buriton Parish Council

## Dark Night Skies



South Downs National Park Authority

Parish Webinar

21<sup>st</sup> April 2021

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# Introduction

- What have we done?
- Why have we bothered?
  
- Not claiming to be 'best practice'
- Just things that have worked for us

# A flavour of the parish

- just south of Petersfield on the Hants / Sussex border
- about 750 people in about 9 square miles



# We like to try new things:

- a 'Heritage Bank' of local history
- an early Village Design Statement (1998)
- a Parish Plan of ideas
- shared space traffic calming & decluttering
- miles and miles without stiles
- created a new Local Nature Reserve
- a Local Food & Farming initiative
- chosen to be a pilot Pollinator Parish

# Buriton's Dark Skies

- People say “wow”: a sky full of stars
- Fortunately sheltered by the Downs
- Decided we wanted to keep & protect
- And to help people appreciate & enjoy

# Events and activities

**Buriton Community Website**

News | What's On | Groups | Local Information | Parish Council | Africa

## Buriton's Dark Night Skies

Over 60 people squeezed into the village hall on Friday 12th February for a night of star-gazing as the Perseid meteor shower passed overhead.

The South Downs National Park's 'Dark Skies' officer, Dan Oakley, said that Buriton sits in the recent bid to create an International Dark Skies Reserve and there are only a handful of locations in the world.

With the weather being too cloudy to set up his huge telescope, Dan projected constellations to Harry Potter characters - and by stressing that they point downwards (not upwards or outwards); his 'Frankie Howard Memorial'.

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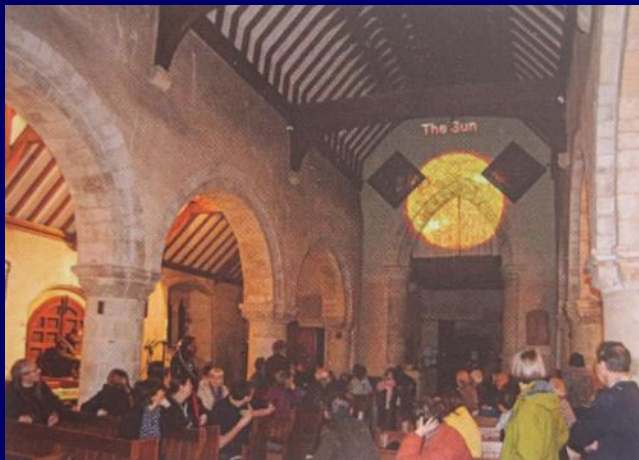
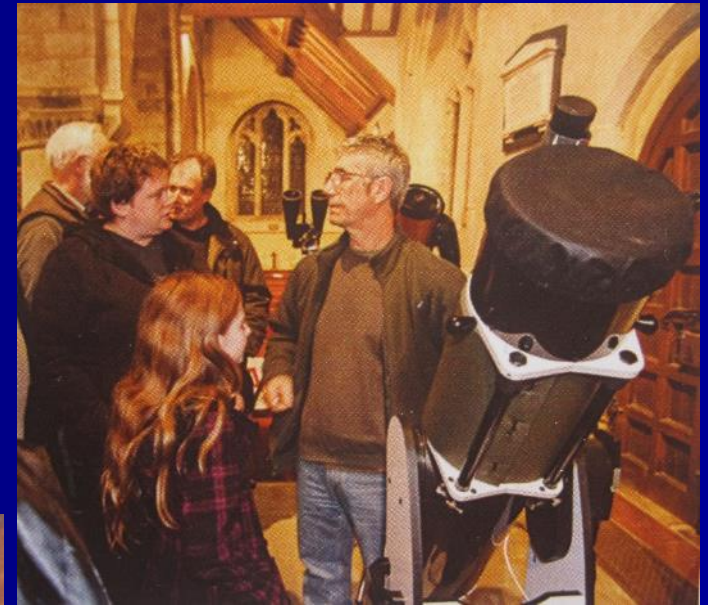
News | What's On | Groups | Local Information | Parish Council | Africa | Useful Information

## The solar system - in fruit

Cloudy skies meant that Buriton's innovative star-gazing party had to stay indoors. But Astro turned St Mary's church into a mini-planetarium for the evening and projected onto the walls and ceiling - and, with the help of local artists, the solar system by using fruit!

Over 70 people turned out on a clear evening and were treated to a presentation by David Woods and co.

# Indoors if necessary



# Opportunities at the annual Village Show

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## Explore the Dark Side of Buriton

Buriton is a great place to enjoy the best free light show that there is - with the stars across the sky. How can we help to protect this?

A new leaflet has been produced for parishioners which explains that, in such a dark place: part of a small area where you can see the Milky Way, the Andromeda Galaxy and other stars.

An International Dark Sky Reserve has been created: one of only 11 in the whole world.

The leaflet, which is being distributed to every household in the parish with the Autumn edition of the Parish Magazine, explains why dark night skies are important for wildlife – and it contains a number of 'top tips' to protect our dark skies.

Lights should only shine where needed (downwards and shielded from neighbouring homes etc); they should only shine when needed (lighting is often not needed for most of the night); and sensible wattages should be used (a 40W light will adequately illuminate the average driveway and garden).

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## Stars at the Village Show

A Roman Legion, Darth Vader, a Jazz Band, Fancy Dress races and information about Buriton's wonderful Dark Night Skies were amongst the star attractions at the 2017 Village Show.

There were also other popular races, competitions and stalls on the recreation ground – as well as all the wonderful displays of fruit, vegetables, flowers, baking and other crafts in the village hall.

# Leaflet to every household

## Explore the Dark Side of Buriton

Buriton is a great place to see stars, whizzing shooting stars,

Less than 10% of the UK population live in areas of stars and the south east is the best place to see them.

But Buriton is a special place. It's a Dark Sky Reserve. International Dark Sky Reserve.

We are part of an impressive Dark Sky Reserve. The Andromeda galaxy and the Milky Way are visible.

And night-time is important for many species.

All our lighting affects the dark night sky.

The light from the universe is being lost. It's a pity to lose it in the last few years.

This leaflet will help explain why and how to help protect them.



## Importance to our wildlife

Dark night skies are not only good for stargazing, they are also important for many animals, birds and insects.

Lights at night can have a bad effect on nocturnal wildlife. Many take advantage of darkness (eg. bats, moths, hedgehog) and daytime creatures (such as birds) by keeping them away from them of rest and energy.

Nearly a third of vertebrates (and two thirds of invertebrates) depend on darkness for survival.

Light pollution can cause them to become disoriented, affect their reproduction and reduced foraging for food.

Unnecessary, poorly-aimed and overly bright lights can affect the cycles, behaviour and mating patterns of bats, birds, moths and many other species.

## Nocturnal wildlife in your garden

Here are a few tips on how you can encourage more nocturnal wildlife in your garden:

- turn off lights when not needed
- buy lamps under 500 lumens
- plant paler flowers to attract night-time insects
- install a bat box.



## Should we put all our lights out?

Of course not, we need light.

- lights should only shine where needed, not into neighbouring homes etc
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- use *sensible wattages*: a 100W driveway and garden; 150W typical domestic or small garden
- *wasted light is wasted money* - lighting in the UK every year costs £1.5 billion.

Powerful lighting is generally unnecessary.

- can be expensive to run
- can hide criminal activity
- unfamiliar territory
- can blind car drivers and pedestrians

Government Crime Prevention Officers can make a better choice."

## Top tips for protecting our dark night sky

- use lower wattage light bulbs
- use light bulbs that are 500 lumens or less
- use the right amount - do not over-light
- use timers
- use proximity sensors
- turn lights off when not needed
- angle all lamps so all the light is directed downwards
- close curtains.

## What can you do to help?

Check the outdoor lighting around your home. Is it really needed?

If not, turn it off, or if it is, make sure that it is fully shielded so light is directed downwards onto the ground.

Buy lamps of under 500 lumens to reduce light pollution.

Spread the word: tell your family, friends and neighbours about why dark sky friendly lighting is important.

The more people that know, the better protected our dark skies will be.

## More information about star-gazing

There are a number of apps for Apple and Android devices:

- [SkyView Free](#) (Android, Free)
- [SkyView Free](#) (Apple, Free)
- [Sky Map](#) (Android, Free)
- [Star Walk 2](#) (Android, Free)
- [Star Walk](#) (Apple, £4.99, or a [free one with adverts](#))

There are also some great resources online, here are just a few:

[www.darkskydiscovery.org.uk](http://www.darkskydiscovery.org.uk)  
[www.bbc.co.uk/science/space](http://www.bbc.co.uk/science/space)  
[www.astronomy.swin.edu.au/cosmos](http://www.astronomy.swin.edu.au/cosmos)  
[www.nasa.gov](http://www.nasa.gov)  
[www.fourmilab.ch/earthview/vplanet.html](http://www.fourmilab.ch/earthview/vplanet.html)  
[www.fourmilab.ch/yoursky](http://www.fourmilab.ch/yoursky)  
[www.sagasonline.org](http://www.sagasonline.org)  
[www.esa.int](http://www.esa.int)

Better lighting helps us to keep the wonderful dark skies that people have enjoyed for ages – and helps everyone appreciate the beauty of the night sky.

The International Dark Sky Association works to protect the night skies for present and future generations. To find out more visit [www.darksky.org](http://www.darksky.org). To find out more about the South Downs Dark Sky Reserve visit [www.southdowns.gov.uk/darksies](http://www.southdowns.gov.uk/darksies)

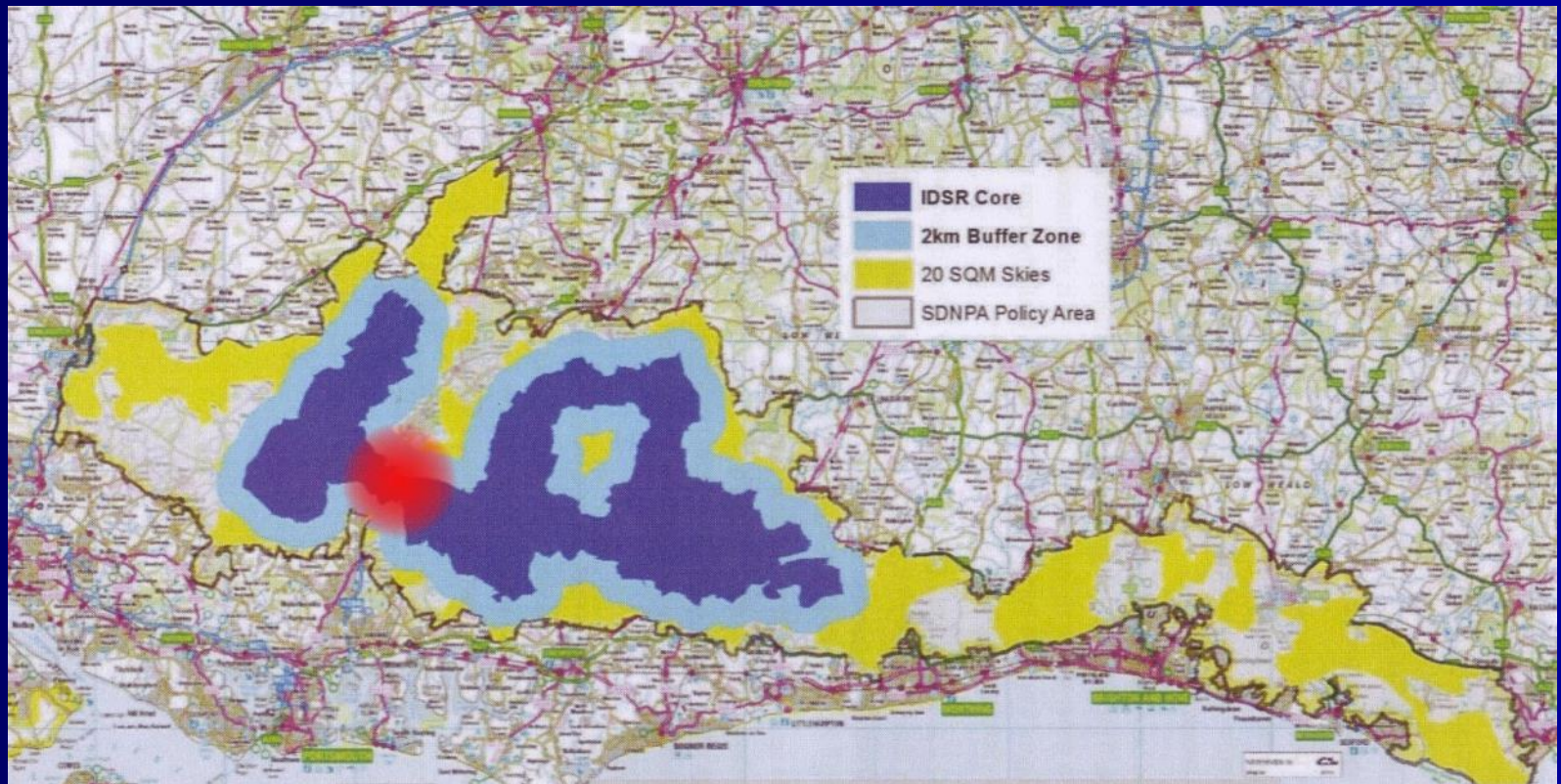
# Street lighting

- Not a problem in many places?
- Bespoke changes to the County's strategy
- Lots of consultation
- Dim by at least 55% at all times (from 45%)
- Dim 'night-time' levels by 75% (from 65%)
- Change 'night-time' hours to: 11pm - 5am (instead of midnight to 5am)
- Since 2019: lights now off 1am to 4am

# Public buildings



# Creation of South Downs Dark Skies Reserve



# Village Design Statement

## Burton Village Design Statement 2017

### Dark night skies and tranquillity



The parish of Burton has some of the most tranquil areas in the South Downs National Park and some of the darkest night skies.

Tranquillity and a sense of isolation in the parish provide inspiration and spiritual well-being for visitors and residents alike in one of the busiest and pressured regions of the country.

The tranquillity of the parish is influenced by things that people can both see and hear around them and part of the parish has been affected by noise from the A3 Trunk Road for a number of years. However, with the introduction of low-noise, 'whisper tarmac' along the length of the A3 through the parish during resurfacing by Highways England in 2015-16, the main cause of noise disturbance in the parish has been removed.



The main audible intrusions affecting the parish are now noisy recreational activities such as off-road vehicles and motorcycles using parts of the Rights of Way network (BOATs) in the parish.

In 2016 the National Park was awarded IKA International Dark Night Skies Reserve status – one of only eleven places in the world to be so accredited. Although the Reserve covers the entirety of the National Park, the status is dependent upon conditions in a continuous dark sky core area and a 2km buffer zone. Any erosion of dark skies conditions in these areas can threaten the International Reserve status.

The parish of Burton sits in the core area of the International Dark Skies Reserve but forms a narrow pinch-point within the Reserve – with more widespread darker areas to the west and to the east (see map opposite). Burton provides a vital part of the core area, sitting between the brighter lights of

Petersfield and Clanfield to the north and south. Any deterioration in the quality of night-time darkness in the parish of Burton could, therefore, threaten the International Reserve status and the National Park Authority has identified Burton as an area which would be particularly vulnerable to change: lying between larger urban settlements to the north and south.

Burton Parish Council is very keen to work with developers, lighting authorities and the Local Planning Authority to conserve and enhance the intrinsic quality of the dark night skies above the parish for the benefit of people and wildlife.

The parish is also working towards IDA Dark Sky

Community status so as to minimise the range of effects of light pollution: wasting energy, costing money, impacting upon wildlife and affecting human health as well as preventing people from enjoying the night skies. The community will be seeking a fully-shielded or full-cutoff standard for all lighting fixtures over 1500 lumens and a threshold of 3,000 kelvins for the allowable correlated colour temperature of all lighting fixtures.

Extra attention must therefore be paid to any proposals which involve the installation of external lighting and where the design of developments may result in light spill from internal lighting. Roof-lights can be particularly intrusive and damaging.



The parish of Burton forms an important pinch-point in the South Downs International Dark Skies Reserve

#### Design guidelines

**T1:** Due regard should be given to the SDNPA's 'dark skies' policies in respect of lighting throughout the parish for both public and private areas so that lighting is (a) kept to the minimum necessary for safety whilst (b) preventing light-spill or glow by incorporating fixtures such as downlights and timing switches

**T2:** Because of the critical, 'pinch-point' location of this parish in the South Downs International Dark Skies Reserve, developments, re-development and alterations should refrain from using roof lights unless it can be proven to be absolutely necessary. Any areas of glazing and roof-lights in new developments and in redevelopments or alterations must also include measures to prevent light pollution (such as specially treated glass)

**T3:** Light pollution from Petersfield already affects the night-time tranquillity of the parish. New development should not exacerbate this problem

**T4:** Development which is detrimental to the amenity value and tranquillity of public rights of way should not be permitted

**T5:** The sense of peace and tranquillity in the parish can also be destroyed by noise and air pollution. Very careful consideration should be given to any new uses which may bring harmful effects. In some cases it may be possible to reduce adverse effects to acceptable levels by design and layout considerations.

# Planning (1)

- VDS is not just for planning applications
- It also helps prior to applications
- The Parish Council cites the VDS in all relevant applications
- The District Council uses Local Plan Dark Skies Policies amongst reasons for refusal
- Upheld in Appeals

# Planning (2)

- 'Permitted Development'
- Over 20 rooflights were approved on one sensitive site (and large areas of glazing)
- Parish Council request for an 'Article 4 Direction' not pursued
- Community feels that Dark Sky conditions will probably gradually deteriorate
- But we'll do all we can ...

# A recent District Council Planning Condition

“Electronically timed blinds shall be installed and permanently maintained to the rooflights and low transmittance glass to the full length windows and French doors approved as part of this permission. The electronically timed blinds shall be fully closed at dusk each day and remain fully closed during hours of darkness. The blinds shall be kept in full working order at all times.”

*Reason - To protect the character of the countryside, and the designated International Dark Night Reserve, which is part of the special quality of the South Downs National Park, in accordance with National Park Purposes and the National Planning Policy Framework 2019.*

# Designated as a Dark Sky Discovery Site



# Additional benefits

- Dark Skies Tourism opportunities for overnight stays at our Village Inn and farmhouse B&Bs (including extended seasons)
- Extra visitors to our Five Bells pub (before star-gazing in the summer or after star-gazing in the winter)
- Wildlife: daytime & night-time creatures (rest, energy, foraging, orientation, reproduction)
- Health and well-being for residents and visitors: calm, tranquil, reflective

# Thank you and good night



*Photograph taken from a Buriton garden*